

1 1. A non-planar log-periodic antenna comprising two
2 radiator arms oriented about a common axis with and
3 enclosing a square pyramidal conductor with truncated tip.

1 2. An antenna as in claim 1 wherein the arms are low
2 ohmic loss metal.

1 3. An antenna as in claim 1 wherein the arms are
2 identical log-periodic shapes, inclined by less than 30
3 degrees to each other, oriented to have 180 degree symmetry
4 about the common axis.

1 4. An antenna as in claim 1 wherein said square pyramidal
2 conductor comprises low loss metal.

1 5. An antenna as in claim 1 wherein the axis of the
2 pyramid and said antenna arm pair are common.

1 6. An antenna as in claim 1 wherein the opening angle of
2 said square pyramidal conductor is one half or less of the
3 inclination angle of said antenna arms.

1 7. An antenna as in claim 1 wherein said square pyramidal
2 conductor has identical projected extent along the common
3 axis as said antenna.

1 8. An antenna comprising two antenna arms and an
2 interior shield wherein the combination of said two antenna
3 arms with said shield in the interior behaves as a
4 log-periodic antenna.

1 9. A non-planar log-periodic antenna comprising four
2 radiator arms oriented about a common axis and enclosing a
3 square pyramidal conductor with truncated tip.

1 10. An antenna as in claim 8 further comprising a short
2 wire attached to the narrow end of each of said antenna
3 arms, at an endpoint of the antenna arm centerline, and
4 threaded into said square pyramidal conductor through said
5 truncated tip of said square pyramidal conductor.

1 11. An antenna as in claim 9 wherein the square pyramidal
2 conductor is enclosed on four sides by four identical
3 log-periodic antenna arms.

1 12. An antenna as in claim 9 having a configuration such
2 that the entire structure behaves as a log-periodic
3 antenna.

1 13. An antenna as in claim 9 further comprising a short
2 wire attached to the narrow end of each of said antenna
3 arms, at an endpoint of the antenna arm centerline, and
4 threaded into said square pyramidal conductor through said
5 truncated tip of said square pyramidal conductor.